

Appl. No. 10/728,321
Response dated 06/27/2007
Reply to Office Action of 02/28/07

REMARKS

Claims 1 – 21 have been rejected under 35 USC §103(a) as being unpatentable over Ewing (U.S. Patent No. 6,407,034) in view of Ewing (U.S. Patent No. 6,284,177) and further in view of Limbach (U.S. Patent No. 3,004,284). The Examiner argues that Ewing '034 discloses a thermally printable multiplayer thermoplastic composite for use as a receipt tape but fails to disclose either an anti-static additive or coating or a cavitation promoting additive, both of which are taught by Ewing '177. The Examiner further argues that while neither of the Ewing references disclose orientation or stretching of the multiplayer film, Limbach shows that such is well known in the art. Applicant acknowledges that uniaxial and biaxial orientation are very well known in the art. However, what cannot be derived from any review of the cited references is the reason such orientation is necessary in the present claimed composites. Neither of the Ewing patents recognize the criticality of a sufficiently high modulus to a functional thermoplastic receipt tape. By the present invention such high modulus is achieved by orientation.

The Examiner has argued that "[B]ecause Ewing does not disclose the thermoplastic composite is non-heat shrinkable, it is expected that the composite of Ewing is non-heat shrinkable." While Applicant admits to being somewhat baffled by this logic, assuming *arguendo* that the composite of Ewing '034 is non-heat shrinkable, one of ordinary skill in the art would expect the film has not been oriented. One of the primary reasons for orienting a film is to render it heat shrinkable. It is agreed that one would not expect the composite of the Ewing'034 reference to be heat shrinkable because

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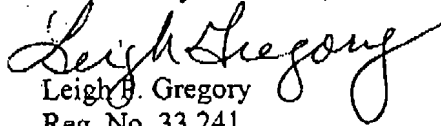
it must be run through a thermal printer and would shrink during the printing process. Thus, it is counterintuitive to think that the composite of Ewing '034 would be oriented, even when combined with Limbach, which merely shows that orientation is known. Hereagain, this is because Ewing '034 (and '177) fails to recognize the need for a high modulus film and, therefore, fails to suggest a means for achieving one. The present claims require a minimum modulus of 150,000 psi. This lower limit does not represent a mere experimental "tweaking" of the film in order to ascertain optimum operating conditions. Rather, Applicant's data clearly show that a sufficiently high modulus is required to provide a film which is useable in point of sale printers. That is, throughout the development of the present inventive composite none of the numerous films which were produced having a modulus of less than 150,000 psi "worked." They either jammed in the printer or could not be cut following printing. It was not until Applicant recognized the criticality of a relatively thin, high modulus film that a useful composite was achieved. The means by which Applicant achieved this high modulus was orientation followed by a heat treatment to render the film non-heat shrinkable. It is respectfully submitted that this critical aspect of the present invention cannot be gleaned from any combination of the Ewing patents and Limbach. Accordingly, it is requested that the Examiner reconsider and withdraw the present rejection.

Accordingly, it is submitted that the present case is in condition for allowance and such action is respectfully requested.

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